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| APPLICATION NO.          | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |  |
|--------------------------|-------------|----------------------|---------------------|------------------|--|
| 10/719,929               | 11/21/2003  | John M. Forsythe     | 1957-6012.1US       | 4005             |  |
| 24247                    | 7590        | 08/28/2008           | EXAMINER            |                  |  |
| TRASK BRITT              |             | HYUN, PAUL SANG HWA  |                     |                  |  |
| P.O. BOX 2550            |             | ART UNIT             |                     | PAPER NUMBER     |  |
| SALT LAKE CITY, UT 84110 |             | 1797                 |                     |                  |  |
|                          |             | NOTIFICATION DATE    |                     | DELIVERY MODE    |  |
|                          |             | 08/28/2008           |                     | ELECTRONIC       |  |

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

USPTOMail@traskbritt.com

|                              |                        |                     |  |
|------------------------------|------------------------|---------------------|--|
| <b>Office Action Summary</b> | <b>Application No.</b> | <b>Applicant(s)</b> |  |
|                              | 10/719,929             | FORSYTHE ET AL.     |  |
|                              | <b>Examiner</b>        | <b>Art Unit</b>     |  |
|                              | PAUL S. HYUN           | 1797                |  |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) Responsive to communication(s) filed on 15 July 2008.  
 2a) This action is FINAL.                    2b) This action is non-final.  
 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) Claim(s) 1,3-13 and 15-20 is/are pending in the application.  
 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.  
 5) Claim(s) \_\_\_\_\_ is/are allowed.  
 6) Claim(s) 1,3-13 and 15-20 is/are rejected.  
 7) Claim(s) \_\_\_\_\_ is/are objected to.  
 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) The specification is objected to by the Examiner.  
 10) The drawing(s) filed on \_\_\_\_\_ is/are: a) accepted or b) objected to by the Examiner.  
     Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
     Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  
 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
 a) All    b) Some \* c) None of:  
     1. Certified copies of the priority documents have been received.  
     2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
     3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)          | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ .                                    |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____.   | 6) <input type="checkbox"/> Other: _____ .                        |

## DETAILED ACTION

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 07/15/08 has been entered.

Claims 1, 3-13 and 15-21 are currently pending.

The claim objection and the rejection under 35 U.S.C. section 112 cited in the previous Office action have been withdrawn in light of the amendments.

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

**Claims 1, 3-13 and 15-21** are rejected under 35 U.S.C. 103(a) as being unpatentable over Peck (US 5,358,851) in view of Anton et al. (US 2001/0053517 A1) and Guyot (US 5,907,925).

Peck discloses a method for quantitatively analyzing toxic chemicals [e.g. 2-methylnaphthalene (see line 36, col. 2)] in soil (see lines 1-17, col. 6). The method comprises the steps of:

- a) providing a kit comprising a container, an adsorbent (e.g. charcoal), buffers and standards (see lines 5-10, col. 6 and lines 58-61, col. 5);
- b) using the adsorbent to collect a sample (e.g. soil) (see lines 5-10, col. 6);
- c) extracting hydrocarbons from the sample by using an extraction solution;
- d) transporting the container to a gas chromatograph; and
- e) quantitatively measuring the amount of extracted hydrocarbons (see Example 4, col. 11).

The method disclosed by Peck differs from the claimed invention in that Peck does not disclose the use of an internal standard. Peck also does not disclose collecting samples at a crop storage facility.

With respect to the internal standard, Anton et al. disclose a kit for collecting and analyzing an unknown sample. The kit comprises a known quantity of internal standard that is used to “spike” the sample. The internal standard is used to determine the natural degradation of the sample from the time the sample is collected and the sample is analyzed (see [0007]). This is accomplished by obtaining the ratio of the quantity of the internal standard at the time of sample analysis and the known initial quantity of internal standard used to spike the sample (see [0022]). In light of the disclosure of Anton et al., it would have been obvious to one of ordinary skill in the art to provide the kit disclosed by Peck with an internal standard to account for the natural degradation of the sample.

With respect to the samples at a crop storage facility (i.e. tuber sample), Guyot discloses that crops take up chemicals present in the soil (see lines 59-65, col. 3). In light of the disclosure of Guyot, and given that the method in Peck is directed towards the analysis of contaminants present in samples that are consumed by humans [i.e. soil, water and air (see lines 5-15, col. 6)], it would have been obvious to one of ordinary skill in the art to collect tuber samples from a crop storage location and apply the test disclosed by Peck to determine the concentration of deleterious chemicals (e.g. sprout inhibitors, pesticides) in the tuber samples. Likewise, it would have been obvious to rinse the tuber sample prior to analysis to remove dirt and other analytes of non-interest, and it would have been obvious to analyze only a section of the tuber to minimize the time and ingredients used for the analysis.

With respect to claim 6, Peck discloses conducting a regression analysis of the data produced by the gas chromatograph (see Example 4, col. 11). Based on the disclosure, it is evident that information about the sample analyzed via gas chromatography is recorded. Otherwise, a regression analysis could not be conducted.

### ***Response to Arguments***

Applicant's arguments with respect to the art rejection have been considered but they are moot in view of the new ground of rejection. Nonetheless, some of Applicant's arguments will be addressed because they are still pertinent.

Applicant's argument that Peck does not disclose collecting a solid, organic sample is not persuasive because Peck discloses that the sample can be soil, which is both solid and organic. Applicant's argument that Peck does not suggest transporting

the sample container from the collection site to a testing site is also not persuasive. Although the reference does not explicitly disclose the step of transporting the sample container from the collection site to a testing facility, the reference does disclose the step of analyzing a portion of the sample using a gas chromatograph to confirm the accuracy of the assay kit. The disclosure suggests that the sample container is transported from the sample collection site to a laboratory.

Applicant's argument that the disclosure of Anton et al. directed towards the use of an internal standard is not applicable because the disclosure is limited to nucleic acid analysis is not persuasive. Although the disclosure of Anton et al. is directed towards the analysis of nucleic acids, its disclosure directed towards the use of the internal standard is not limited to nucleic acid analysis. Conceptually, the internal standard disclosed by Anton et al. is identical to the standard used in the claimed invention. Based on the disclosure of Anton et al., one of ordinary skill in the art would recognize that an internal standard can be used to determine the natural degradation of any sample that undergoes natural degradation.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to PAUL S. HYUN whose telephone number is (571)272-8559. The examiner can normally be reached on Monday-Friday 8AM-4:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jill Warden can be reached on (571)-272-1267. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Yelena G. Gakh/  
Primary Examiner, Art Unit 1797

/Paul S Hyun/  
Examiner, Art Unit 1797